



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/945,558	08/30/2001	Stephen Jones	LIT-114/AME 1412	1831
32205	7590	05/05/2005	EXAMINER	
PATTI & BRILL ONE NORTH LASALLE STREET 44TH FLOOR CHICAGO, IL 60602			EMDADI, KAMRAN	
			ART UNIT	PAPER NUMBER
			2667	

DATE MAILED: 05/05/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/945,558

Applicant(s)

JONES ET AL.

Examiner

Kamran Emdadi

Art Unit

2667

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 August 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-39 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-39 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>3 sheets</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 3-11, 19-20, 23-26, 28-31 and 35 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The term "minor" in claims 3, 5, 10, 19-20, 23 and 35 is a relative term which renders the claim indefinite. The term "minor" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. The Examiner suggests removing the term "minor" from the claim language.

The term "approximately" in claim 4 is a relative term which renders the claim indefinite. The term "approximately" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. The Examiner suggests removing the term "approximately" from the claim language.

The term "majority" in claim 24 is a relative term which renders the claim indefinite. The term "majority" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. The Examiner suggests removing the term "approximately" from the claim language.

The term "contemporaneously" in claim 25 is a relative term which renders the claim indefinite. The term "contemporaneously " is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. The Examiner suggests removing the term "approximately" from the claim language.

Regarding claim 26, lines 6-10 on page 38 contains language that is not understandable and is thus rendered indefinite, specifically, with regard to the first communication node and the time slot.

Regarding claim 28, the wherein clause on line 3 of claim 28 begins by describing "the portion of central-output information comprises a portion of first central-output information" – then the claim continues to describe "further comprising second processorless-central equipment that is connected with the plurality of communication nodes." Is the second processorless-central equipment a part of the first central-output information? If so the Examiner does not understand the claim language, and if not then the wherein clause should be removed from its position and perhaps indenting should be used to separate the elements of the system described in claim 28. Accordingly, claims 29-31 are also rejected from being dependent on claim 28.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-2, 12-14, 21-22, 32-34, 36-39 are rejected under 35 U.S.C. 102(e) as being anticipated by Fuhrmann et al. (U.S. Patent Application No. 2001/0048688).

Regarding claims 1, 34 and 37, Fuhrmann teaches a network configuration including a plurality of nodes 1-4 and 9, where node 9 is an active star node coupled to each of the plurality of nodes 1-4 (see figure 1). The active star node 9 enables communication between the nodes allowing messages or data to be transferred from one node to all of the other nodes connected to the active star node 9 (see [0025]). A first network node may send a pilot signal to the active star node 9, which can then send the data and additionally a control signal to another star interface (see [0013]), where the another star interface is associated with another network node (see [0009]).

Regarding claim 2, Fuhrmann teaches a frame used in communications (see [0011]).

Regarding claims 12 and 38, Fuhrmann teaches comparing one or more messages with the time slot of the communication frame for managing correctness (see [0051] and figure 5).

Regarding claims 13-14, Fuhrmann teaches processing node-output information and a second node sending one or more portions of information (see [0059]).

Regarding claims 21, Fuhrmann teaches sending the output information to all the nodes (see [0007]).

Regarding claim 22, Fuhrmann teaches TDM (see [0047]).

Regarding claim 32-33, 36 and 39 Fuhrmann teaches a maintenance node, the start node that receives information from an assigned network node and transfers the information to the other network nodes.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 15-18 and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fuhrmann in view of Chao (U.S. Patent No. 6,487,213).

Fuhrmann teaches a processorless network configuration that utilizes logic circuitry to convey messages across a network, however, these teachings are silent regarding fiber optics or copper passages. Chao discloses a network arbitration scheme that uses logic circuitry instead of a processor to handle packet data communications. The teachings include a fiber optic and copper passage (column 3,

Art Unit: 2667

line 5), a flip-flop D (column 17, lines 40-45) operating for a "0" value and a clock (column 22, lines 10-14).

Both of these references disclose the need for accurate switching mechanisms for a plurality of nodes, as is evident from the disclosure of the respective specifications (see column 11, lines 60-68 of Chao and [0010] of Fuhrmann). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined the teachings of these two references to arrive at the features recited in claims 15-18 and 27.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kamran Emdadi whose telephone number is 571-272-6047. The examiner can normally be reached M-F between the hours of 8am-5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chi Pham can be reached on 571-272-3179. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Application/Control Number: 09/945,558
Art Unit: 2667

Page 7

Kamran Emdadi

April 26, 2005



CHI PHAM
SUPERVISORY PATENT EXAMINE
TECHNOLOGY CENTER 2667

4/28/05